U. S. DEPARTMENT OF COMMERCE
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NATIONAL BUREAU OF STANDARDS
LYMAN J. BRIGGS, Director

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CHARTS FOR TESTING LENS RESOLUTION

By Irvine C. Gardner

This publication consists of 8 pages [1] of charts designed for testing the resolving power of photographic lenses. The charts have been printed from an intaglio plate engraved on a dividing engine and reproduced by the Bureau of Engraving and Printing by methods identical with those used for the production of postage stamps. It is believed that these charts are as accurate as can be made at a cost permitting general distribution.

When cut apart in accordance with the guide marks at the edges of the pages, 48 charts will be available. When they are photographed with a lens of focal length f, from the distance $26f$, the charts are reproduced on the negative with linear dimensions reduced to one twenty-fifth of their actual value. After this reproduction the number of lines per millimeter, as recorded on the negative, will be 3.5, 5, 7, 10, 20, 14, 28, 40, and 56, as indicated by the numbers on the chart. It will be noted that this series of numbers forms a geometric series with the ratio between two successive terms approximately equal to the square root of 2. Full instructions for using these charts are given in the National Bureau of Standards Circular C428, copies of which may be secured from the Superintendent of Documents, Washington, D. C., for 40 cents each.

[1] The Bureau's official (free) distribution and the distribution by the Superintendent of Documents to Government depositories is limited to one page of six charts.

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WASHINGTON : 1940

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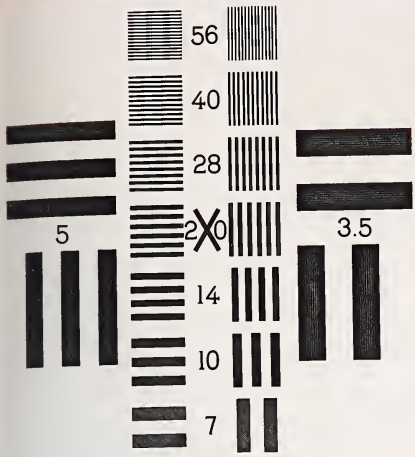
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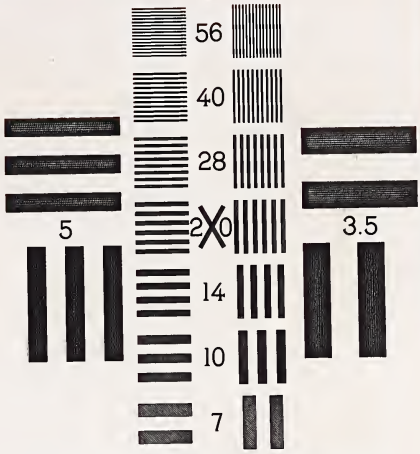
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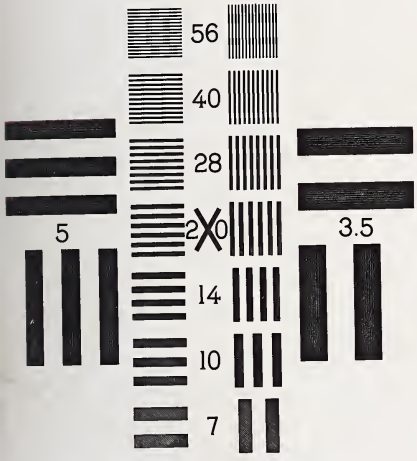
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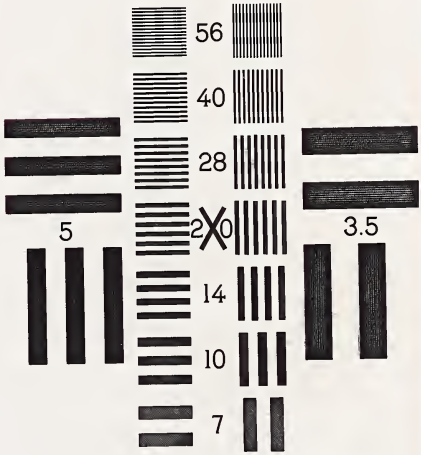
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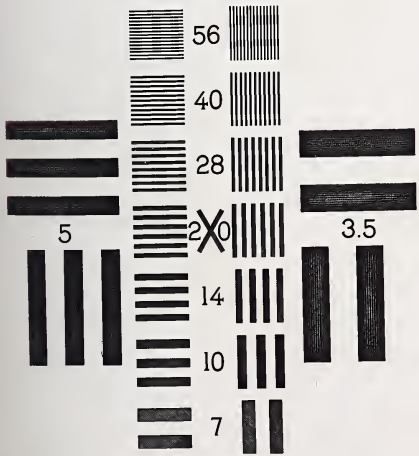
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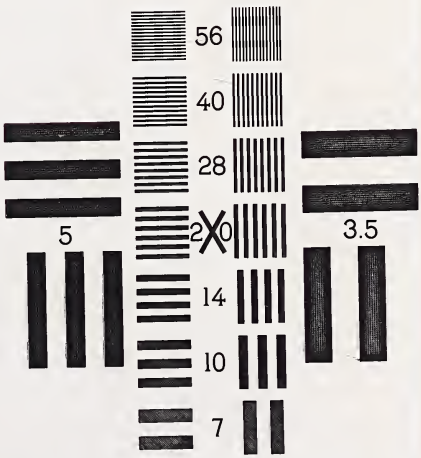
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